

Abstract

A reloadable launcher for use with rocket-propelled projectiles. An inner and outer tube define a concentric tube arrangement with at least one gas flow channel being defined therebetween. A ring is fixedly coupled to a first end of the outer tube that is adjacent to the breech end of the inner tube. The ring defines a keyway and an annular channel that lies between the keyway and the first end of the outer tube. A cap having a concave inner surface terminates in a peripheral edge that defines a key shaped for passage through the keyway of the ring. When the cap's key is aligned with and moved axially through the keyway, the key resides in the annular channel adjacent the first end of the outer tube. A link is hingedly coupled on one end thereof to the ring to permit the cap to be moved such that a projectile can be loaded into the inner tube from the breech end thereof. The link is also rotationally coupled to the cap's central portion such that the cap can be rotated thereabout.

As a result, when the key resides in the annular channel and the cap is rotated about it's central portion, the key is misaligned with the keyway to axially lock the cap to the outer tube.